

ABSTRACT

Upon a selector operation of a valve such as a four-way selector valve provided in a refrigerating cycle for selecting a channel of fluid, prevention of environmental pollution and energy saving and the like are effectively achieved. A sliding valve is coupled with a piston in a housing of a channel selector valve provided in a refrigerating cycle and the sliding valve moves due to a difference in pressure and so on at both sides of the piston, thereby a channel of fluid is selected. A processing section of a control device is constituted with microcomputers of an indoor and outdoor control sections, while a detecting section of the control device includes temperature sensor, detection means for detecting pressure, detection means for detecting flow rate, detection means for detecting voltage/current, and detection means for detecting frequency. Driving sections of an electrically-driven expansion valve, an indoor heat exchanger, an outdoor heat exchanger and a compressor are means that function in response to execution of control programs so that physical quantity, such as pressure, differential pressure and flow rate in the channel selector valve provided in the refrigerating cycle, and a rate of change in physical quantity, such as a rate of change in pressure, a rate of change in differential pressure and a rate of change in flow rate, are controlled, thereby a channel of the fluid is selected by the channel selector valve.